

Docket No.: 5173-0103PUS1 (PATENT)

### IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Patent Application of: Hironobu TERAOKA et al.

Application No.: 10/588,802

Filed: August 9, 2006

For: IMPELLER FOR BLOWER AND AIR CONDITIONER HAVING THE SAME

Confirmation No.: 9726

Art Unit: 3745

Examiner: Not Yet Assigned

# LETTER

Commissioner for Patents P.O. Box 1450 Alexandria, VA 22313-1450

Sir

Subsequent to the filing of the above-identified application on August 9, 2006, attached hereto are Form PCT/IB/373, and Form PCT/ISA/237 that should be made of record in the present application.

If necessary, the Commissioner is hereby authorized in this, concurrent, and future replies, to charge payment or to credit any overpayment to Deposit Account No. 02-2448 for any Application No.: 10/588,802 Docket No.: 5173-0103PUS1

additional fees required under 37 C.F.R. § 1.16 or under 37 C.F.R. § 1.17; particularly, extension of time fees.

Dated: June 29, 2007

Respectfully submitted,

D. Richard Anderson

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# PATENT COOPERATION TREATY

# **PCT**

# INTERNATIONAL PRELIMINARY REPORT ON PATENTABILITY

(Chapter I of the Patent Cooperation Treaty)

(PCT Rule 44bis)

Applicant's or agent's file reference P3S2005209	FOR FURTHER ACTION	See item 4 below					
International application No. PCT/JP2005/018129	International filing date (day/month/year) 30 September 2005 (30.09.2005)	Priority datc (day/month/year) 30 September 2004 (30.09.2004)					
International Patent Classification (8th edition unless older edition indicated) See relevant information in Form PCT/ISA/237							
Applicant DAIKIN INDUSTRIES, LTD.		4					

1.	This international preliminary report on patentability (Chapter I) is issued by the International Bureau on behalf of the International Searching Authority under Rule 44 bis.1(a).					
2.	This REPORT consists of a total of 4 sheets, including this cover sheet.					
	In the attached sheets, any reference to the written opinion of the International Searching Authority should be read as a reference to the international preliminary report on patentability (Chapter I) instead.					
3.	. This report contains indications relating to the following items:					
	Box No. I	Basis of the report				
	Box No. Π	Priority				
	Box No. III	Non-establishment of opinion with regard to novelty, inventive step and industrial applicability				
	Box No. IV	Lack of unity of invention				
	Box No. V	Reasoned statement under Article 35(2) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement				
	Box No. VI	Certain documents cited				
	Box No. VII	Certain defects in the international application				
	Box No. VIII	Certain observations on the international application				
4.	The International Bureau will cornot, except where the applicant m date (Rule 44bis .2).	nmunicate this report to designated Offices in accordance with Rules 44bis.3(c) and 93bis.1 but takes an express request under Article 23(2), before the expiration of 30 months from the priority				
		Date of issuance of this report				
		03 April 2007 (03.04.2007)				

Authorized officer

e-mail: pt07.pct@wipo.int

Yoshiko Kuwahara

Facsimile No. +41 22 338 82 70 Form PCT/IB/373 (January 2004)

The International Bureau of WIPO 34, chemin dcs Colombettes 1211 Geneva 20, Switzerland

# PATENT COOPERATION TREATY

TRANSLATION INTERNATIONAL SEARCHING AUTHORITY Ta WRITTEN OPINION OF THE INTERNATIONAL SEARCHING AUTHORITY (PCT Rule 43bis 1) Date of mailing (day/month/year) Applicant's or agent's file reference FOR FURTHER ACTION P3S2005209 See paragraph 2 below International application No. International filing date (day/month/year) Priority date (day/month/year) PCT/JP2005/018129 30.09.2005 30.09.2004 International Patent Classification (IPC) or both national classification and IPC Applicant DAIKIN INDUSTRIES, LTD. This opinion contains indications relating to the following items: Box No. I Basis of the opinion Box No. II Box No. III Non-establishment of opinion with regard to novelty, inventive step and industrial applicability Box No. IV Lack of unity of invention Reasoned statement under Rule 43bis.1(a)(i) with regard to novelty, inventive step or industrial Box No. V applicability: citations and explanations supporting such statement Box No. VI Certain documents cited Box No. VII Certain defects in the international application Box No. VIII Certain-observations on the international application FURTHER ACTION If a demand for international preliminary examination is made, this opinion will be considered to be a written opinion of the International Preliminary Examining Authority ("IPEA") except that this does not apply where the applicant chooses an Authority other than this one to be the IPEA and the chosen IPEA has notified the International Bureau under Rule 60.1bis(b) that written opinions of this International Searching Authority will not be so considered. If this opinion is, as provided above, considered to be a written opinion of the IPEA, the applicant is invited to submit to the IPEA a written reply together, where appropriate, with amendments, before the expiration of 3 months from the date of mailing of Form PCT/ISA/220 or before the expiration of 22 months from the priority date, whichever expires later. For further options, see Form PCT/ISA/220. For further details, see notes to Form PCT/ISA/220. Name and mailing address of the ISA/JP Date of completion of this opinion Authorized officer Facsimile No. Telephone No.

### WRITTEN OPINION OF THE INTERNATIONAL SEARCHING AUTHORITY

International application No.
PCT/JP2005/018129

		101/012003/010123
Box No.	I Basis of this opinion	
I. Wi	th regard to the language, this opinion has been established on the basis of:	
	the international application in the language in which it was filed	
	the translation of the international application into	, which is the language of a
	translation furnished for the purposes of international search (Rule 12.3(a) and 23.1(b))	
2. Wi	th regard to any nucleotide and/or amino acid sequence disclosed in the internation entition. this opinion has been established on the basis of:	nal application and necessary to the claimed
a.	type of material	
	a sequence listing	
	table(s) related to the sequence listing	
b.	format of material	
	on paper	
	in electronic form	
c.	time of filing/furnishing	
	contained in the international application as filed	
	filed together with the international application in electronic form	
	furnished subsequently to this Authority for the purposes of search	
_		
3.	In addition, in the case that more than one version or copy of a sequence listing and furnished, the required statements that the information in the subsequent or additional filed or does not go beyond the application as filed, as appropriate, were furnished.	Vor table(s) relating thereto has been filed or copies is identical to that in the application as
4. Add	ditional comments:	
		***

#### WRITTEN OPINION OF THE INTERNATIONAL SEARCHING AUTHORITY

International application No.
PCT/JP2005/018129

Box No. V	Reasoned stateme citations and expl	nt under Ru anations su	de 43bis.1(a)(i) with regard to novelty, inv porting such statement	rentive step or industrial applicability;	
I. Statement					
Novelty	(N)	Claims	1-22		YE
•		Claims			NC
Inventiv	e step (IS)	Claims	8, 9, 16-19, 21, 22	2	YΈ
		Claims	1-7, 10-15, 20		NO
Industria	al applicability (IA)	Claims	1-22		YΈ
		Claims			NO
		-			

# 2. Citations and explanations:

Document 1: JP 3-249400 A (Matsushita Electric Industrial Co., Ltd.), 07 November 1991 Document 2: JP 10-252689 A (Mitsubishi Electric Corp.), 22 September 1998 Document 3: JP 9-327156 A (Denso Corp.), 16 December 1997

The inventions of claims 1, 2, 5, 10, 12, and 20 do not appear to possess inventive step over documents 1 and 3. Document 1 describes "providing notches intermittently at intervals in a lengthwise direction of a blade." See figure 4 of document 3 in regard to claim 10 in particular. See figure 6 of document 3 in regard to the invention of claim 11.

The inventions of claims 3, 4, 6, 7, and 11 do not appear to possess inventive step over documents 1 and 2. The inventions of documents 1 and 2 both relate to technologies for preventing noise and combining the inventions described in these documents to achieve a further effect would be easy for a person skilled in the art.

The inventions of claims 13-15 do not appear to possess inventive step over documents 1-3. The numerical range prescribed by the claims could be empirically determined by a person skilled in the art.